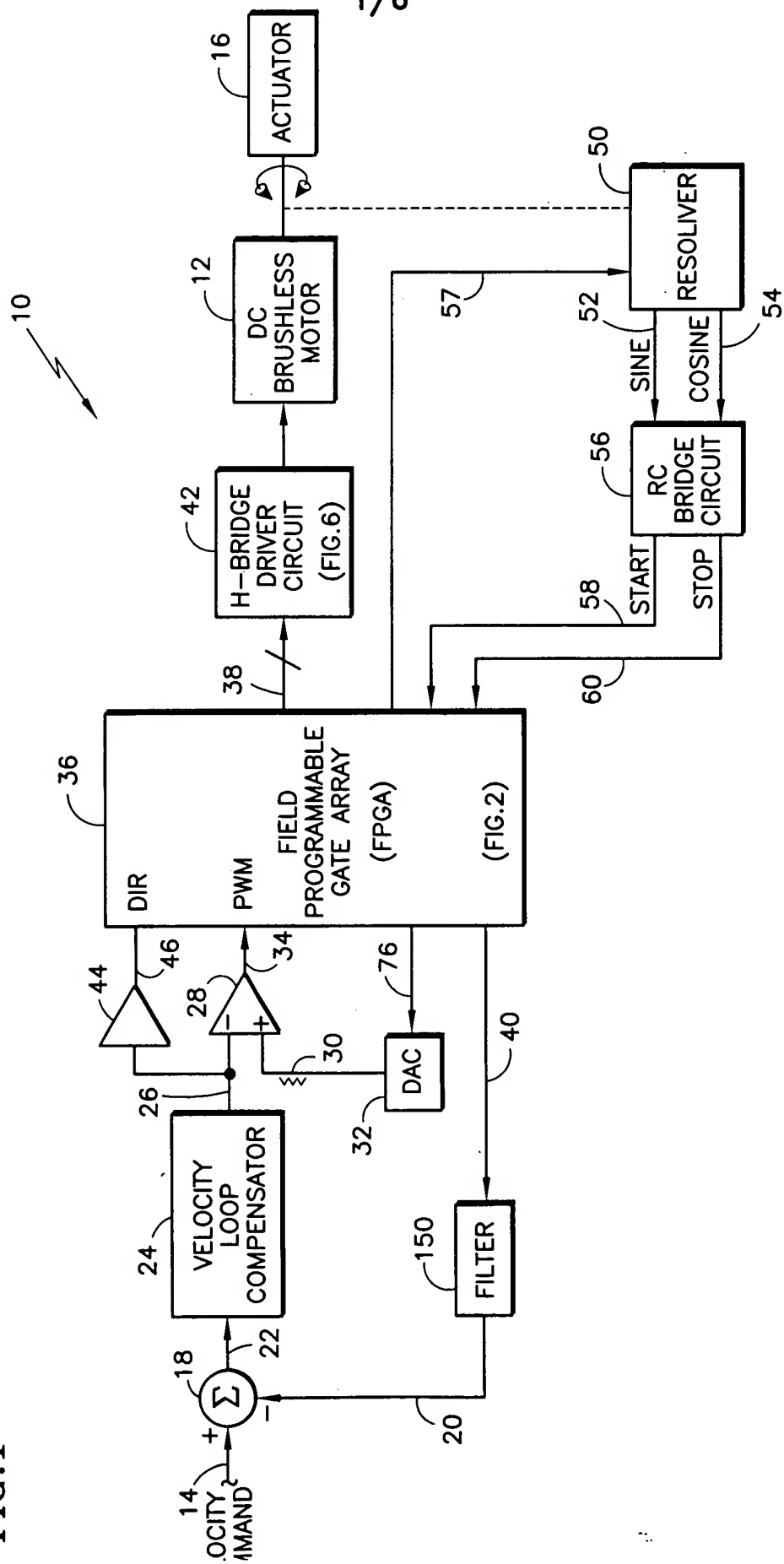
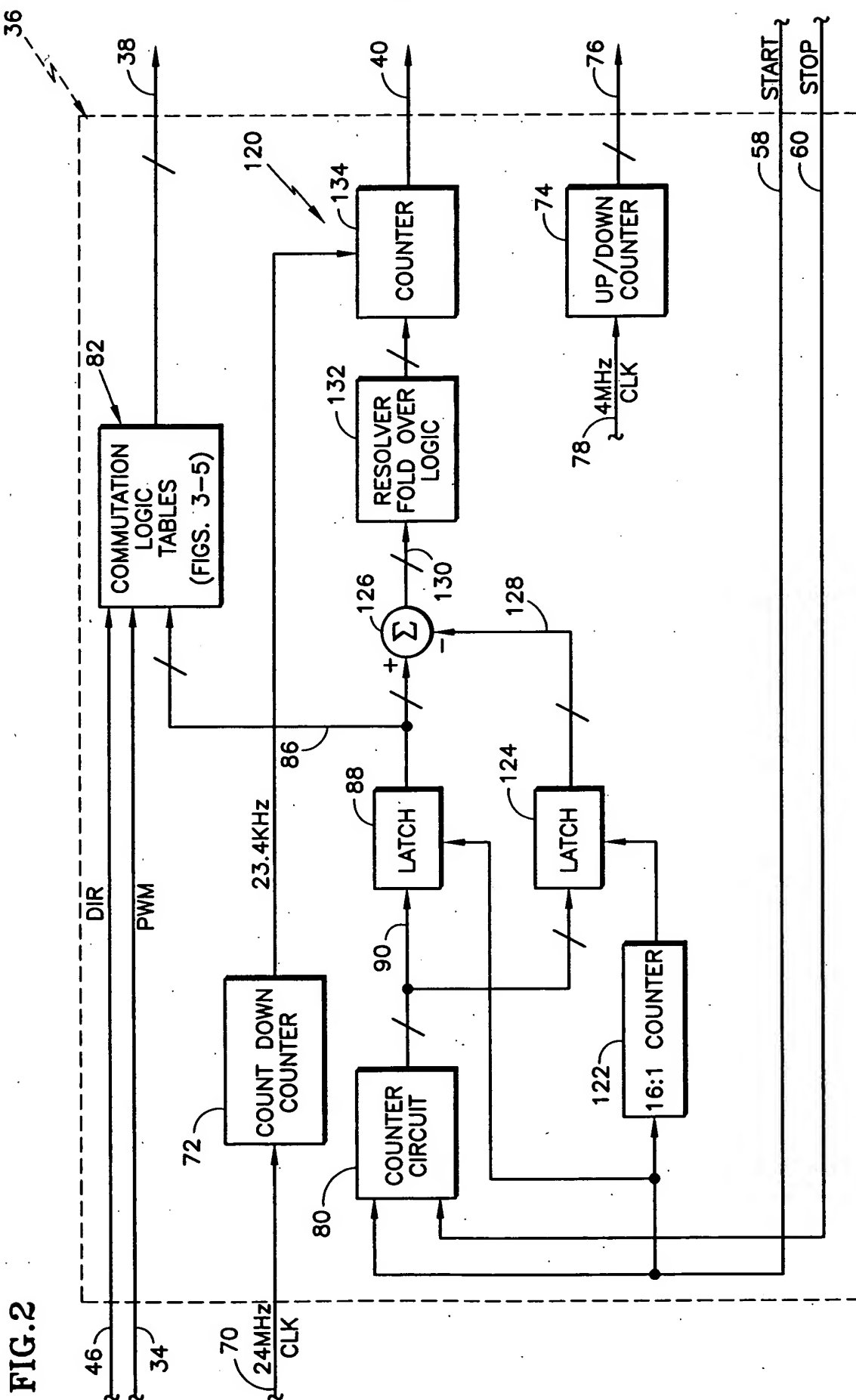


FIG. 1





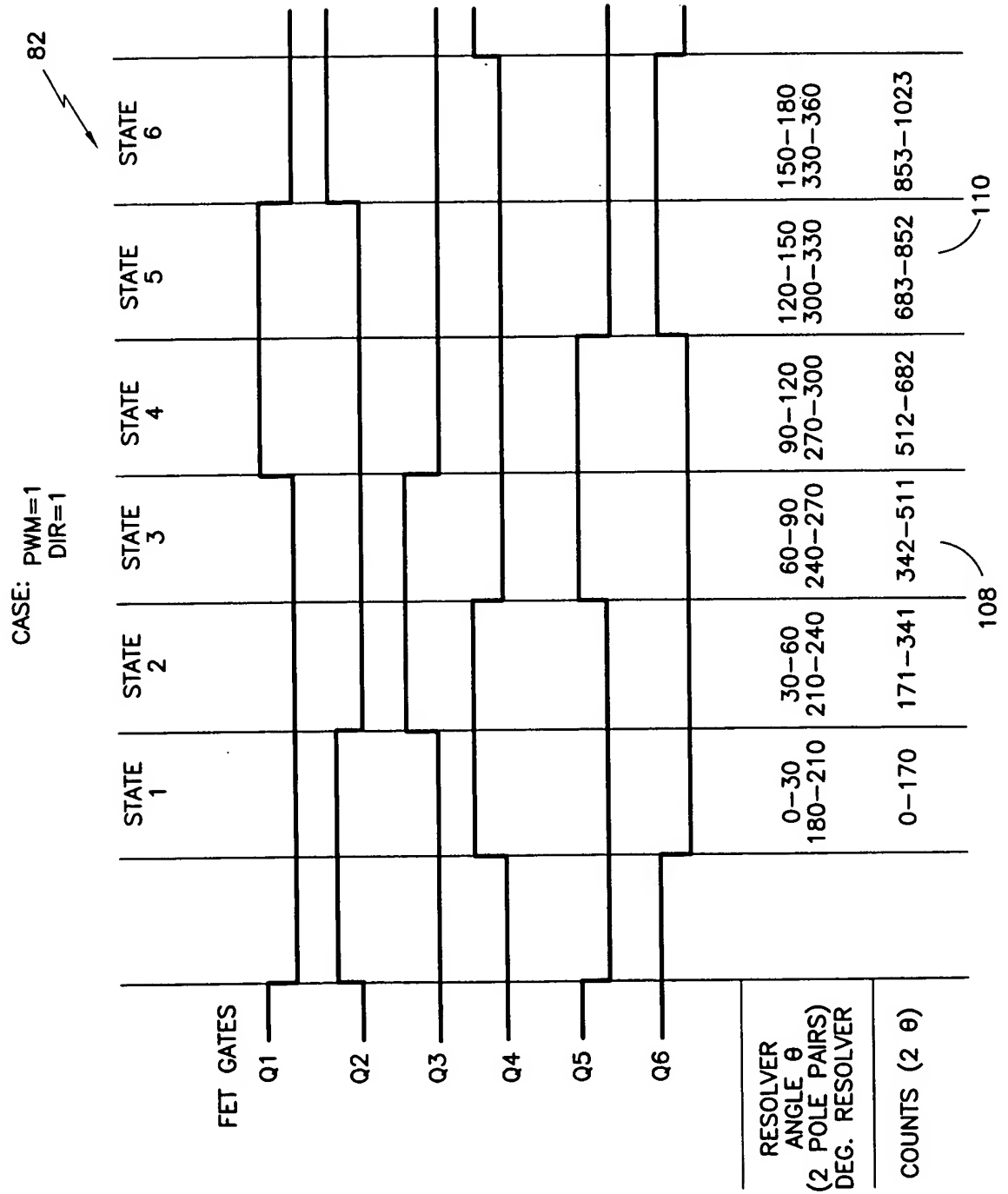
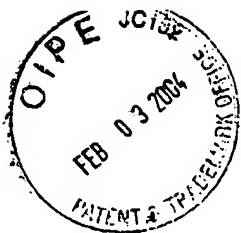


FIG.3



CASE: PWM=1  
DIR=0

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IG.4

	STATE 1	STATE 2	STATE 3	STATE 4	STATE 5	STATE 6	
FET GATES							
Q1							
Q2							
Q3							
Q4							
Q5							
Q6							
RESOLVER ANGLE $\theta$ (2 POLE PAIRS) DEG. RESOLVER	0-30 180-210	30-60 210-240	60-90 240-270	90-120 270-300	120-150 300-330	150-180 330-360	
COUNTS (2 $\theta$ )	0-170	171-341	342-511	512-682	683-852	853-1023	

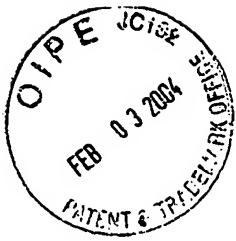


FIG. 5

CASE: PWM=0  
DIR=0 OR 1

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DIR = 1    PWM = 0  
DIR = 0    PWM = 0

	STATE 1	STATE 2	STATE 3	STATE 4	STATE 5	STATE 6	
FET GATES							
Q1 0							
Q2 0							
Q3 0							
Q4 1							
Q4 0							
Q5 1							
Q5 0							
Q6 1							
Q6 0							
RESOLVER ANGLE $\theta$ (2 POLE PAIRS) DEG. RESOLVER	0-30 180-210	30-60 210-240	60-90 240-270	90-120 270-300	120-150 300-330	150-180 330-360	
COUNTS (2 $\theta$ )	0-170	171-341	342-511	512-682	683-852	853-1023	

FIG.6

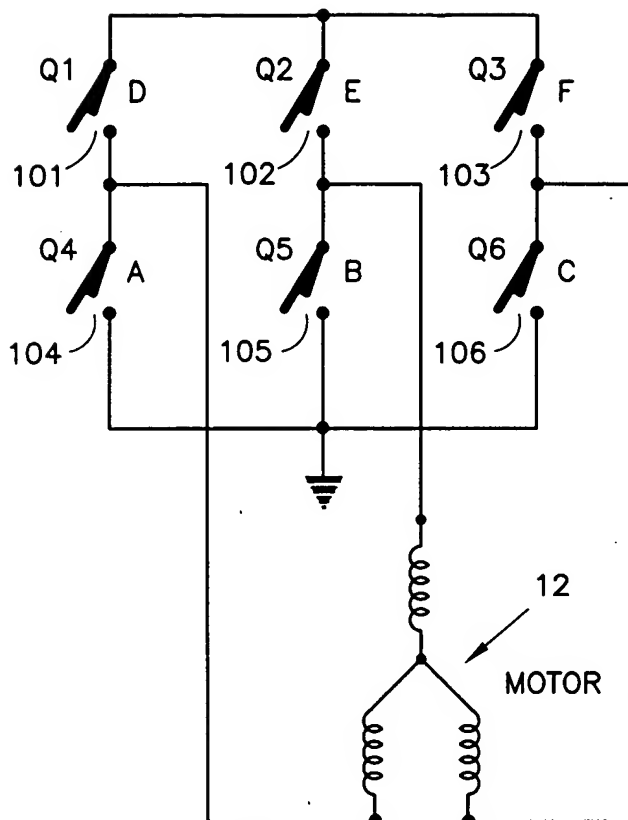


FIG.7

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IF MAGNITUDE > 180 DEG. ELEC.
  IF SIGN IS NEG, ADD 360 DEG. ELEC.
ELSE
  IF SIGN IS POS, SUBTRACT 360 DEG. ELEC.
ELSE
  OUTPUT = INPUT
  
```